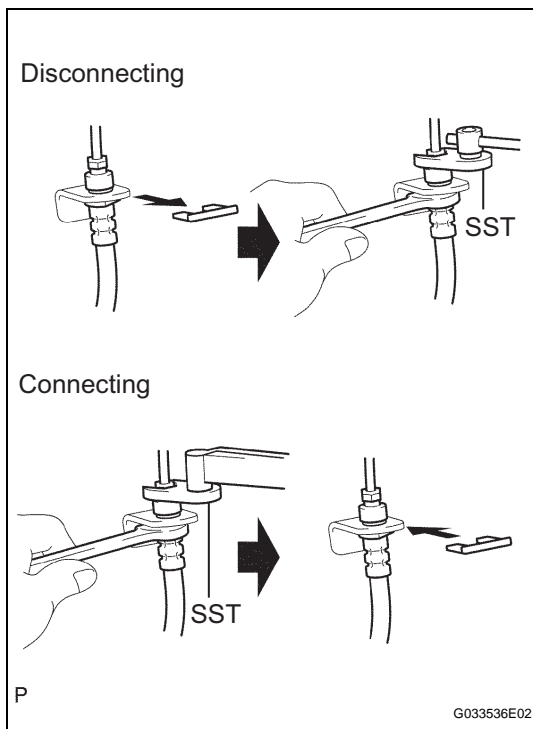


BRAKE SYSTEM

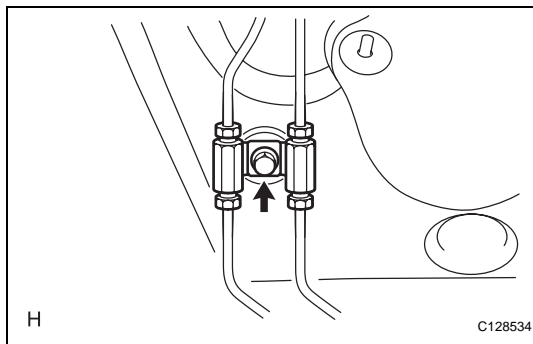
PRECAUTION

NOTICE:

- Take extra care to replace each part properly. Improper installation or repair could affect the performance of the brake system and cause a driving hazard.
- It is very important to keep the brake system parts and the work area clean when repairing the brake system.
- If the vehicle is equipped with a mobile communication system, refer to the Precautions in the INTRODUCTION section (see page [IN-5](#)).
- Care must be taken when using magnets as they could affect the performance of the speed sensors.
- Since the brake line is one of the critical safety-related parts, be sure to disassemble the components if a brake fluid leak is found. If any abnormality is found, replace the component with a new one.
- When removing brake components, cover the brake tube connections to prevent foreign matter such as dust or dirt from entering the tubes.
- Do not damage or deform the brake tubes when removing or installing them.
- When installing a brake tube grommet to the body, ensure that the brake tube passes through the center of the grommet.
- When installing a brake tube or flexible hose, ensure that it is not twisted or bent.
- If the fitting of the flexible hose does not match the groove on the bracket, twist the hose slightly to insert it.
- Flexible hoses must be free from absorber oil, grease, etc.
- When installing a brake tube to a plastic clamp, ensure that the brake tube is not loose or being pinched.
- Do not reuse a clip or plastic clamp removed from a flexible hose.
- After installing a brake tube and flexible hose, ensure that they do not interfere with any other components.
- Do not allow brake fluid to adhere to any painted surface such as the vehicle body. If brake fluid leaks onto any painted surface, immediately wash it off.



- Follow these procedures when disconnecting the flexible hose and brake tube.
 - (a) Remove the clip.
 - (b) Hold the flexible hose with a wrench. Using SST, disconnect the brake tube without deforming the tube.
- Follow these procedures when connecting the flexible hose and brake tube.
 - (a) Hold the flexible hose with a wrench. Using a union nut wrench, connect the brake tube without deforming the tube.
 - (b) Install a new clip.



- Follow these procedures when connecting the brake tube and 2-way.
 - (a) Support the 2-way to prevent deformation to the brake tube and connect the brake tube to the 2-way with a union nut wrench.
 - (b) Support the 2-way to prevent deformation to the brake tube and install the bolt to fix the 2-way to the body.

PROBLEM SYMPTOMS TABLE

(2005/11-2006/01)

HINT:

Use the table below to help determine the cause of the problem symptom. The potential causes of the symptoms are listed in order of probability in the "Suspected area" column of the table. Check each symptom by checking the suspected areas in the order they are listed. Replace parts as necessary.

Brake system

Symptom	Suspected area	See page
Low pedal or spongy pedal	1. Fluid leaks in brake system	-
	2. Air in brake system	BR-6
	3. Front brake piston seals (worn or damaged)	BR-40
	4. Rear brake piston seals (worn or damaged)	BR-55
	5. Brake master cylinder (faulty)	BR-21
	6. Booster push rod (adjustment necessary)	BR-24
Brake drag	1. Brake pedal free play (minimum)	BR-14
	2. Parking brake lever travel (adjustment necessary)	PB-1
	3. Parking brake cable (sticking)	PB-8
	4. Parking brake shoe clearance (adjustment necessary)	PB-17
	5. Front brake pad (cracked or distorted)	BR-40
	6. Rear brake pad (cracked or distorted)	BR-55
	7. Parking brake lining (cracked or distorted)	PB-13
	8. Front brake piston (stuck or frozen)	BR-40
	9. Rear brake piston (stuck or frozen)	BR-55
	10. Parking brake shoe return tension spring	PB-13
	11. Booster push rod (adjustment necessary)	BR-24
	12. Vacuum leaks in booster system	BR-29
	13. Brake master cylinder (faulty)	BR-21
Brake pull	1. Front brake piston (stuck or frozen)	BR-40
	2. Rear brake piston (stuck or frozen)	BR-55
	3. Front brake pad (oily, cracked or distorted)	BR-40
	4. Rear brake pad (oily, cracked or distorted)	BR-55
	5. Parking brake lining (oily, cracked or distorted)	PB-13
	6. Front brake disc (uneven wear)	BR-40
	7. Rear brake disc (uneven wear)	BR-55
Hard pedal but braking inefficient	1. Front brake pad (worn, cracked, distorted, oily or glazed)	BR-40
	2. Rear brake pad (worn, cracked, distorted, oily or glazed)	BR-55
	3. Parking brake lining (worn, cracked, distorted, oily or glazed)	PB-13
	4. Front brake disc (uneven wear)	BR-40
	5. Rear brake disc (uneven wear)	BR-55
	6. Booster push rod (adjustment necessary)	BR-24
	7. Vacuum leaks in booster system	BR-29

Symptom	Suspected area	See page
Noise from brakes	1. Front brake pad (cracked, distorted, dirty or glazed)	BR-40
	2. Rear brake pad (cracked, distorted, dirty or glazed)	BR-55
	3. Front disc brake pad support plate (loose)	BR-40
	4. Rear disc brake pad support plate (loose)	BR-55
	5. Front disc brake cylinder slide pin (worn)	BR-40
	6. Rear disc brake cylinder slide pin (worn)	BR-55
	7. Front brake installation bolt (loose)	BR-45
	8. Rear brake installation bolt (loose)	BR-60
	9. Front brake disc (scored)	BR-40
	10. Rear brake disc (scored)	BR-55
	11. Parking brake shoe return tension spring (faulty)	PB-13
	12. Front brake anti-squeal shim (damaged)	BR-40
	13. Rear brake anti-squeal shim (damaged)	BR-55
	14. Parking brake shoe hold-down spring (damaged)	PB-13

PROBLEM SYMPTOMS TABLE

(2006/01-)

HINT:

Use the table below to help determine the cause of the problem symptom. The potential causes of the symptoms are listed in order of probability in the "Suspected Area" column of the table. Check each symptom by checking the suspected areas in the order they are listed. Replace parts as necessary.

Brake system

Symptom	Suspected Area	See page
Low pedal or spongy pedal	1. Fluid leaks in brake system	-
	2. Air in brake system	BR-6
	3. Front brake piston seals (worn or damaged)	BR-40
	4. Rear brake piston seals (worn or damaged)	BR-55
	5. Brake master cylinder (faulty)	BR-22
	6. Booster push rod (adjustment necessary)	BR-24
Brake drag	1. Brake pedal free play (minimum)	BR-15
	2. Parking brake lever travel (adjustment necessary)	PB-1
	3. Parking brake cable (sticking)	PB-8
	4. Parking brake shoe clearance (adjustment necessary)	PB-17
	5. Front brake pad (cracked or distorted)	BR-40
	6. Rear brake pad (cracked or distorted)	BR-55
	7. Parking brake lining (cracked or distorted)	PB-13
	8. Front brake piston (stuck or frozen)	BR-40
	9. Rear brake piston (stuck or frozen)	BR-55
	10. Parking brake shoe return tension spring	PB-13
	11. Booster push rod (adjustment necessary)	BR-24
	12. Vacuum leaks in booster system	BR-29
	13. Brake master cylinder (faulty)	BR-22
Brake pull	1. Front brake piston (stuck or frozen)	BR-40
	2. Rear brake piston (stuck or frozen)	BR-55
	3. Front brake pad (oily, cracked or distorted)	BR-40
	4. Rear brake pad (oily, cracked or distorted)	BR-55
	5. Parking brake lining (oily, cracked or distorted)	PB-13
	6. Front brake disc (uneven wear)	BR-40
	7. Rear brake disc (uneven wear)	BR-55
Hard pedal but braking inefficient	1. Front brake pad (worn, cracked, distorted, oily or glazed)	BR-40
	2. Rear brake pad (worn, cracked, distorted, oily or glazed)	BR-55
	3. Parking brake lining (worn, cracked, distorted, oily or glazed)	PB-13
	4. Front brake disc (uneven wear)	BR-40
	5. Rear brake disc (uneven wear)	BR-55
	6. Booster push rod (adjustment necessary)	BR-24
	7. Vacuum leaks in booster system	BR-29

Symptom	Suspected Area	See page
Noise from brakes	1. Front brake pad (cracked, distorted, dirty or glazed)	BR-40
	2. Rear brake pad (cracked, distorted, dirty or glazed)	BR-55
	3. Front disc brake pad support plate (loose)	BR-40
	4. Rear disc brake pad support plate (loose)	BR-55
	5. Front disc brake cylinder slide pin (worn)	BR-40
	6. Rear disc brake cylinder slide pin (worn)	BR-55
	7. Front brake installation bolt (loose)	BR-45
	8. Rear brake installation bolt (loose)	BR-60
	9. Front brake disc (scored)	BR-40
	10. Rear brake disc (scored)	BR-55
	11. Parking brake shoe return tension spring (faulty)	PB-13
	12. Front brake anti-squeal shim (damaged)	BR-40
	13. Rear brake anti-squeal shim (damaged)	BR-55
	14. Parking brake shoe hold-down spring (damaged)	PB-13

PARKING BRAKE SYSTEM

PROBLEM SYMPTOMS TABLE

HINT:

Use the table below to help determine the cause of the problem symptom. The potential causes of the symptoms are listed in order of probability in the "Suspected area" column of the table. Check each symptom by checking the suspected areas in the order they are listed. Replace parts as necessary.

Parking brake system

Symptom	Suspected area	See page
Parking brake drags	1. Parking brake lever travel (adjustment necessary)	PB-1
	2. No. 1 parking brake cable (sticking)	PB-4
	3. No. 2 parking brake cable (sticking)	PB-8
	4. No. 3 parking brake cable (sticking)	PB-8
	5. Parking brake shoe clearance (adjustment necessary)	PB-15
	6. Shoe return tension spring (damaged)	PB-13

ADJUSTMENT

1. CHECK PARKING BRAKE LEVER TRAVEL

- (a) Pull the lever upward with a force of approximately 200 N (20 kgf, 44 lbf) and count the number of clicks.

OK:

7 to 9 clicks (without rear brake dragging)

2. REMOVE UPPER REAR CONSOLE PANEL SUB-ASSEMBLY (See page [IP-19](#))

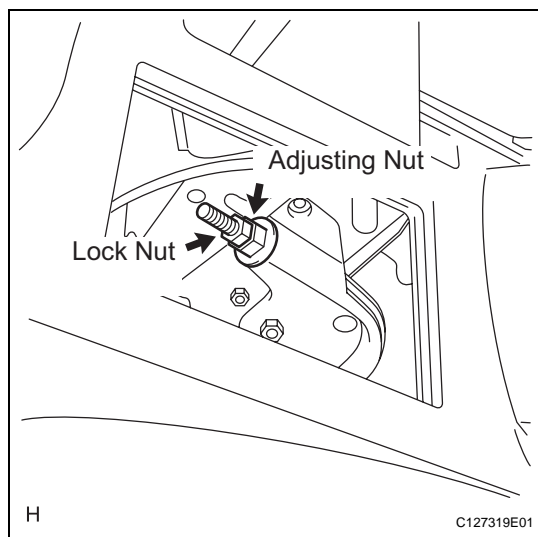
3. LOOSEN LOCK NUT AND NO. 1 WIRE ADJUSTING NUT

4. REMOVE REAR WHEEL

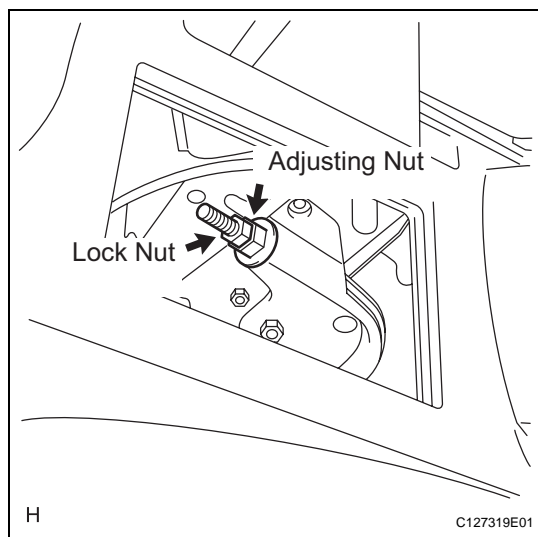
5. ADJUST PARKING BRAKE SHOE CLEARANCE (See page [PB-17](#))

6. INSTALL REAR WHEEL

Torque: 103 N*m (1,050 kgf*cm, 76 ft.*lbf)



PB



7. ADJUST PARKING BRAKE LEVER TRAVEL

- (a) Turn the No. 1 wire adjusting nut until the lever travel is correct.

OK:

7 to 9 clicks (without rear brake dragging)

<Lever pulling force: approximately 200 N (20 kgf, 44 lbf)>

- (b) Tighten the lock nut.

Torque: 6.0 N*m (61 kgf*cm, 53 in.*lbf)

- (c) Operate the parking brake lever 3 to 4 times, and check the parking brake lever travel.

OK:

7 to 9 clicks (without rear brake dragging)

<Lever pulling force: approximately 200 N (20 kgf, 44 lbf)>

- (d) When operating the parking brake lever, check that the brake warning light illuminates at the first click.

Standard condition:

Brake warning light always illuminates at the first click.